

IN THE CLAIMS

Please amend the claims as follows:

1. (currently amended) A method of regulating an average rate of transmission on a computer network employing TCP, comprising:
 - determining an amount of available space in a receive buffer at a receiver;
 - reading data from the receive buffer such that the amount of available space in the receive buffer is maintained at a regulated value; and
 - regulating a rate at which data is delivered to the receive buffer based on a priority of the data, such that the priority of the data results in an absolute transfer rate of the data, wherein the priority of the data is a function of the identity the receiver.
2. (previously presented) The method of claim 1, wherein reading data comprises regulating a frequency at which data is read from the receive buffer.
3. (previously presented) The method of claim 1, wherein reading data comprises regulating an amount of data read during each read from the receive buffer.
4. (original) The method of claim 1, wherein a receiver measures an actual transfer rate.
5. (previously presented) The method of claim 1, wherein determining an amount of available space in a receive buffer is performed by a rate control module located on a receiver.
6. (original) The method of claim 5, wherein the rate control module operates above a TCP layer and communicates with the TCP layer via a TCP application programming interface.

7. (original) The method of claim 1, wherein the average rate of transmission is regulated to an extent sufficient to reduce the effect that a transmission has on another transmission in the computer network.
8. (previously presented) The method of claim 1, wherein removing data comprises using a determined frequency of lost packets.
9. (currently amended) A method of regulating an average rate of transmission on a computer network employing TCP, comprising:
 - determining an amount of available space in a receive buffer at a receiver;
 - regulating an available space in the receive buffer by regulating a size of the receive buffer; and
 - regulating a rate at which data is delivered to the receive buffer based on a priority of the data, such that the priority of the data results in an absolute transfer rate of the data, wherein the priority of the data is a function of the identity of the receiver.
10. (original) The method of claim 9, wherein a receiver determines an actual transfer rate.
11. (previously presented) The method of claim 9, wherein determining an amount of available space in a receive buffer is performed by a rate control module located on a receiver.
12. (original) The method of claim 11, wherein the rate control module operates above a TCP layer and communicates with the TCP layer via a standard TCP application programming interface.
13. (original) The method of claim 9, wherein the average rate of transmission is reduced.

14. (previously presented) The method of claim 13, wherein the reduction in average rate of transmission is sufficient to reduce an effect that a transmission has on another transmission in the computer network.

15. (previously presented) The method of claim 9, wherein reducing the receive buffer size comprises using a determined frequency of lost packets.

16. (currently amended) A system for regulating an average rate of transmission on a computer network, comprising:

a receive buffer located on a receiver;

a rate control module coupled to the receiver, the rate control module configured to determine available space in the receive buffer and to regulate a rate at which data is read from the receive buffer, such that the amount of available space in the receive buffer is maintained at a regulated value and;

a transfer management module configured to regulate the rate at which data is delivered to the receive buffer based on a priority of the data, wherein the priority of the data results in an absolute transfer rate of the data, wherein the priority of the data is a function of the identity of the receiver.

17. (previously presented) The system of claim 16, wherein the rate control module regulates the rate at which data is read by varying a frequency at which data is read from the receive buffer.

18. (previously presented) The system of claim 16, wherein the rate control module regulates the rate at which data is read by varying an amount of data read during each read from the receive buffer.

19. (original) The system of claim 16, wherein the rate control module operates above a TCP layer and communicates with the TCP layer via a standard TCP application programming interface.
20. (original) The system of claim 19, wherein the rate control module operates between the TCP layer and an FTP/HTTP layer.
21. (previously presented) The system of claim 19, wherein the rate control module is integrated into an FTP/HTTP layer.
22. (original) The system of claim 16, wherein the average rate of transmission is reduced.
23. (previously presented) The system of claim 22, wherein the reduction in average rate of transmission is sufficient to reduce an effect that a transmission has on another transmission.
24. (original) The system of claim 16, wherein the regulation of a rate at which data is removed is a function of a determined frequency of lost packets.

25. (currently amended) A system for transmitting data over a computer network employing TCP, comprising:

a sender;

a receiver;

a receive buffer coupled to the receiver;

a rate control module configured to regulate an amount of space available in the receive buffer to influence an average rate that data is read from the receive buffer and transferred from the sender to the receiver; and

a transfer management module configured to regulate communication between the sender and receiver based on a priority of the data, wherein the priority of the data results in an absolute transfer rate of the data and the priority of the data is a function of the identity of the receiver.

26. (previously presented) The system of claim 25, wherein the rate control module regulates the amount of space available in the receive buffer by varying a frequency at which data is read from the receive buffer.

27. (previously presented) The system of claim 25, wherein the rate control module regulates the amount of space available in the receive buffer by varying an amount of data read during each read from the receive buffer.

28. (original) The system of claim 25, wherein the rate control module operates above a TCP layer and communicates with the TCP layer via a standard TCP application programming interface.

29. (original) The system of claim 28, wherein the rate control module operates between the TCP layer and an FTP/HTTP layer.

30. (previously presented) The system of claim 28, wherein the rate control module is integrated into an FTP/HTTP layer.
31. (original) The system of claim 25, wherein the average rate of transmission is reduced.
32. (previously presented) The system of claim 31, wherein the reduction in average rate of transmission is sufficient to reduce an effect that a transmission has on another transmission.
33. (original) The system of claim 25, wherein the rate control module regulates the amount of space using a determined frequency of lost packets.
34. (cancelled)
35. (previously presented) The system of claim 25, wherein the transfer management module further comprises a schedule manager.
36. (previously presented) The system of claim 25, wherein the priority of the data is associated with a transmission rate and proportion of utilized bandwidth.
37. (previously presented) The system of claim 16, wherein the priority of the data is associated with a transmission rate and proportion of utilized bandwidth at which the data is delivered to the receive buffer.
38. (previously presented) The system of claim 16, wherein the priority of the data is further responsive to traffic at the receiver.

39. (previously presented) The system of claim 25, wherein the priority of the data is further responsive to traffic at the receiver.